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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/798,858

03/12/2004

Marten C. Rhead

TAPEMEAS.IDC

6700

7590

11/03/2006

R. F. Gallagher
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EXAMINER

SMITH, RICHARD A

ART UNIT

PAPER NUMBER

2859

DATE MAILED: 11/03/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/798,858	RHEAD, MARTEN C.	
	Examiner	Art Unit	
	R. Alexander Smith	2859	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 18 July 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final:
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-18 and 20-23 is/are pending in the application.
- 4a) Of the above claim(s) 11-14 is/are withdrawn from consideration.
- 5) ☒ Claim(s) 23 is/are allowed.
- 6) ☐ Claim(s) 1-9, 11-18 and 20-22 is/are rejected.
- 7) ☒ Claim(s) 10 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Arguments

Applicant's arguments filed July 18, 2006 have been fully considered but they are not persuasive.

With respect to page 8 and the Japanese references and being a different patent from that cited on page 2 by the examiner:

This discussion is unclear to the Examiner because JP 6147802 as cited on page 2 was listed on the PTO-892 mailed December 15, 2004 and had been scanned into the official electronic database for this application. It should be viewable in PAIR.

With respect to JP 08251060 having been provided to the Applicant for a "dimension measuring method and device": The only JP 08251060 reference the examiner can find is titled "ATTACHMENT AND DETACHMETN (sic) STRUCTURE OF EXTERNAL DEVICE" and a text search for the title as given results in the following JP references, i.e., JP 2002243411 A, JP 2002156221 A and JP 08136250. The examiner can find no single reference with the patent number and title as stated by Applicant, and none of the above found JP references appear relevant; it therefore is unclear as to which JP reference the Applicant is possibly referring.

Addendum: Toward the end of preparing this Office action, the examiner noted that JP 10122801 has the title of "DIMENSION MEASURING METHOD AND DIMENSION MEASURING DEVICE" which is similar to the above title and which has been used in the

rejections along with JP 6147802. JP 10122801 was listed on the PTO-892 mailed August 31, 2005.

With respect to the argument spanning pages 8-9, i.e., none of the references provide for hook having a T-shaped cross section, and with regard to the sketch which is shown in the arguments filed December 5, 2005: This added language in the amendment is already shown in the previously applied JP 6,147,802 and therefore the argument is not persuasive. Figure 5 shows non-slip surfaces on the inside faces for upper and lower portions of the T-shaped cross-section. Furthermore, figure 1, 4 and 5 show the non-slip surface on the inside face, figure 2 shows the non-slip surface on the outside face and figure 3 shows non-slip surfaces on both the inside and the outside faces. Therefore JP 6,147,802 addresses the newly added limitations in the amended claim 1 for the shape of the hook and the application of non-slip means to both upper and lower portions and selectively to either outside faces, inside faces or both faces.

With respect to the argument spanning pages 10-11 regarding parallax, elimination by illuminating an entire tape and claims 8 and 15-18 (for 15-18 in particular claim 18): The examiner agrees with the applicant's argument that parallax cannot be eliminated, or does not avoid the problem of parallax, by illuminating an entire tape portion. Claim 8 as amended has overcome the prior art rejection applied in the previous Office action. However, claim 18 states that the light is configured so that the problem of parallax is largely avoided. Largely is a

relative term and "largely avoided" is not the same as eliminated or avoided as argued by applicant. Therefore, with the light of Cohen et al. being mounted in the body above the area to be read and since illumination does help a person in sighting the measuring length with a measuring mark or point on the work surface when the tape and the surface are dimly lit, it appears to the examiner that the limitations as claimed are met.

With respect to claim 3 and US 14,947 to Ballou: In this case, the examiner had made a typo. 14,947 to Ballou should have been RE 14,947 to Ballou; however, Ballou is clearly disclosed in the IDS dated December 15, 2004.

Other notes with regard to the Non-Compliant Letter mailed on July 31, 2005 and the Withdrawal Letter mailed on October 12, 2006: The Non-Compliant Letter as written was incorrect; however in retrospect, the amendment filed July 18, 2006 can be considered as non-compliant but is sufficiently compliant to permit examination. In particular, new claim 20 contains underlining for newly added text (a cut and paste from amended claim 8) and, claim 10 has an incorrect status identifier since it states that it is amended but the examiner can find no deletions, additions or indicators of what has been changed.

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1, 2, 4-7 and 15-18 are finally rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. 4,516,325 to Cohen et al. in view of U.S. 5,402,583 to Komura and JP 6147802 A to Uchiyama.

Cohen discloses a tape measure having a coiled tape in a housing and a tape hook external on an unattached end portion of the tape, and measurement lines and numerals on a concave side portion of the tape which are incremented from the hook and can be read when the hook is pulled from the housing (figure 1), a light and light emitting diode positioned to illuminate the tape (60), a tape brake and a light switch which is positioned to work in conjunction with the brake (figure 4), the light switch comprises a slide button positioned in the vicinity of the tape brake.

With respect to claim 7, button wall 54 is centrally located on the backside of the sliding brake (figures 7A and 7B) which activates the contacts 70 to the light when the brake is slid on and which deactivates the contacts when the brake is slid off. In a broad sense, this appears to the examiner as meeting the limitations as claimed.

Cohen does not disclose said tape measure having a non slip means positioned along an outer face portion of the hook, the hook having a T shaped cross section, said T having an upper portion and a lower portion and the non-slip means being positioned on an outside face portion including the upper portion of the T and said non slip means comprising a roughened surface having a multiplicity of rough points.

Komura discloses an endhook having a non slip means comprising a roughened surface having a multiplicity of rough points (figure 3 and 4d). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the endhook, taught by Cohen, to include a roughened surface on the inside surface, as taught by Komura, in order to hold the hook in place along a hooked surface.

Uchiyama discloses that a non-slip surface (3) and a somewhat roughened non-slip surface (figure 4) can be applied to both the inner and outer surfaces of an endhook and further discloses that the endhook can be in the form of a T (figure 5) having upper and lower portions with the non-slip means applied to both portions. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the endhook with the roughened surface, taught by Cohen and Komura, to include a T-shape with upper and lower portions, as taught by Uchiyama, and to place the non-slip roughened surface on the outside face of the upper portion, as suggested by Uchiyama, in order to provide a non-slip outer surface so the hook will not slid when in an abutting position to a work surface and to help prevent bowing of the tape when pressed against the work surface.

With respect to the limitations of claims 16 and 18 (same as the previously applied rejection of claim 8 in the Office action mailed August 31, 2005), i.e., to illuminate a measured

length on the tape, and a focused light positioned configured so that the problem of parallax is largely avoided: It appears to the examiner that a broad interpretation of Cohen meets the limitations as claimed. Cohen's LED focuses the light to illuminate the entire section of the tape including the exact measured length thereby meeting the limitation of a comprising claim which includes the exact measured length being illuminated. With respect to the parallax, this is met by the better illumination of the tape and of the general surface so that the user can better observe what length matches the point of the surface much more so then when the tape and the surface are dimly lit. Therefore, it appears to the examiner that in a broad sense the limitations of claim 16 and 18 are met through the normal operation of the tape measure disclosed by Cohen as modified by Komura and Uchiyama.

With respect to claims 15-18: the method steps will be met during the normal operation of the tape measure disclosed by Cohen as modified by Komura and Uchiyama.

3. Claim 3 is finally rejected under 35 U.S.C. 103(a) as being unpatentable over Cohen et al., Komura and Uchiyama as applied to claims 1, 2, 4-7 and 15-18 above, and further in view of U.S. RE 14,947 to Ballou.

Cohen et al., Komura and Uchiyama together teach all that is claimed as discussed in the above rejections of claims 1, 2, 4-7 and 15-18 except for said non slip means comprising a pointed barb

Ballou discloses a end hook attachment wherein the outside includes a barb (barb 7 as used in figure 4). Therefore, it would have been obvious to one of ordinary skill in the art at the

time of the invention to modify the outside of the end hook, taught by Cohen, Komura and Uchiyama, to include a pointed barb as a non-slip means, as taught by Ballou, in order to provide a barb large and sharp enough to tack the endhook into a surface to prevent slipping on or along said surface.

4. Claims 8 and 9 are finally rejected under 35 U.S.C. 103(a) as being unpatentable over Cohen et al., Komura and Uchiyama as applied to claims 1, 2, 4-7 and 15-18 above, and further in view of U.S. 2005/0150126 to Marshall et al.

Cohen et al., Komura and Uchiyama together teach all that is claimed as discussed in the above rejections of claims 1, 2, 4-7 and 15-18 except for the limitations of claims 8 and 9.

Marshall et al. discloses a tape measure wherein a laser is used to illuminate a measured length on the tape (abstract) and teaches a focused light positioned to precisely and more brightly illuminate the measured length on the tape than the surrounding lines therealong so that the exact measured length on the rope is clearly indicated by the focused light and the problem of parallax is avoided (see figure 4 and paragraph 0018). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the light, taught by Cohen et al., to be a laser that illuminates the exact measured length, as taught by Marshall et al., in order to highlight the exact measurement to be read.

5. Claims 8 and 9 are finally rejected under 35 U.S.C. 103(a) as being unpatentable over Cohen et al., Komura and Uchiyama as applied to claims 1, 2, 4-7 and 15-18 above, and further in view of JP 10,122,801 to Nagano et al.

Cohen et al., Komura and Uchiyama together teach all that is claimed as discussed in the above rejections of claims 1, 2, 4-7 and 15-18 except for the focused light comprises a laser.

Nagano et al. discloses a tape measure wherein a separate laser can be used to highlight a measurement on tape. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the light, taught by Cohen et al., to be a laser, as suggested by Nagano et al., in order to highlight the exact measurement to be read.

6. Claims 20-22 are finally rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. 4,516,325 to Cohen et al. in view of U.S. 2005/0150126 to Marshall et al.

Cohen discloses a tape measure having a coiled tape in a housing and a tape hook external on an unattached end portion of the tape, and measurement lines and numerals on a concave side portion of the tape which are incremented from the hook and can be read when the hook is pulled from the housing (figure 1), a light and light emitting diode positioned to illuminate the tape (60).

Cohen does not teach a focused light positioned to precisely and more brightly illuminate the measured length on the tape than the surrounding lines therealong so that the exact measurement length on the tape is clearly indicated by the focused light and the problem of

parallax is avoided thereby enabling the precise measured length to be read when one's eye is not aligned along the front edge portion of the housing, and a laser.

Marshall et al. discloses a tape measure wherein a laser is used to illuminate a measured length on the tape (abstract) and teaches a focused light positioned to precisely and more brightly illuminate the measured length on the tape than the surrounding lines therealong so that the exact measured length on the rope is clearly indicated by the focused light and the problem of parallax is avoided (see figure 4 and paragraph 0018). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the light or LED, taught by Cohen et al., to be focused to a precise measured line or to be a laser that illuminates to the precise measured line, as taught by Marshall et al., in order to highlight the exact measurement to be read.

7. Claims 20-22 are finally rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. 4,516,325 to Cohen et al. in view of JP 10-122,801 to Nagano et al.

Cohen discloses a tape measure having a coiled tape in a housing and a tape hook external on an unattached end portion of the tape, and measurement lines and numerals on a concave side portion of the tape which are incremented from the hook and can be read when the hook is pulled from the housing (figure 1), a light and light emitting diode positioned to illuminate the tape (60).

Cohen does not teach a focused light positioned to precisely and more brightly illuminate the measured length on the tape than the surrounding lines therealong so that the exact

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measurement length on the tape is clearly indicated by the focused light and the problem of parallax is avoided thereby enabling the precise measured length to be read when one's eye is not aligned along the front edge portion of the housing, and a laser.

Nagano et al. discloses a tape measure wherein a separate laser can be used to highlight a measurement on tape in order to determine an accurate measurement. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the light or LED, taught by Cohen et al., to be focused to a precise measured line or to be a laser that illuminates to the precise measured line, as suggested by Nagano et al., in order to highlight the exact measurement to be read.

Allowable Subject Matter

8. Claim 23 is allowable.
9. Claim 10 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten to include all of the limitations of the base claim and any intervening claims.
10. As allowable subject matter has been indicated, applicant's reply must either comply with all formal requirements or specifically traverse each requirement not complied with. See 37 CFR 1.111(b) and MPEP § 707.07(a).

Conclusion

11. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

12. The prior art made of record and not relied upon is considered pertinent to Applicant's disclosure. The prior art cited in PTO-892 and not mentioned above disclose related end hooks.

13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to R. Alexander Smith whose telephone number is 571-272-2251. The examiner can normally be reached on Monday through Friday from 9:30-6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Diego F. Gutierrez can be reached on 571-272-2245. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A handwritten signature in black ink, appearing to read 'R. Alexander Smith', with a large, stylized flourish extending from the end of the signature.

R. Alexander Smith
Primary Examiner
Technology Center 2800

RAS
October 24, 2006